

## ABSTRACT

An illumination system includes a plurality of solid state light emitters and a scanner operative to sequentially receive light from the plurality of solid state light emitters and to provide a time-multiplexed light output. The solid state light emitters are each operated in pulse mode to increase their brightness relative to the light output of similar emitters operating in continuous mode. The time multiplexed light output is a generally continuous output having a brightness that is greater than the brightness of the output of similar emitters operating in continuous mode. The time multiplexed light output is useful in photolithography and machine vision applications.